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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/814,959	03/31/2004	Kutay F. Ustuner	2004P01660US	8319
7590 10/18/2007 Siemens Corporation Intellectual Property Department 170 Wood Avenue South Iselin, NJ 08830			EXAMINER  LAMPRECHT, JOEL	
			ART UNIT	PAPER NUMBER
,			3737	
			MAIL DATE	DELIVERY MODE
		<i>'</i> .	10/18/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

· · · · · · · · · · · · · · · · · · ·	Application No.	Applicant(s)			
·	10/814,959	USTUNER ET AL.			
Office Action Summary	Examiner	Art Unit			
-	Joel M. Lamprecht	3737			
The MAILING DATE of this communication ap	<u> </u>				
Period for Reply					
A SHORTENED STATUTORY PERIOD FOR REPL WHICHEVER IS LONGER, FROM THE MAILING D  - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period  - Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailin earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNIC 136(a). In no event, however, may a re will apply and will expire SIX (6) MONT e, cause the application to become ABA	CATION.  Poply be timely filed  THS from the mailing date of this communication.  ANDONED (35 U.S.C. § 133).			
Status					
1) Responsive to communication(s) filed on <u>06 J</u>	<u>une 2007</u> .				
<i>,</i> —	•				
3) Since this application is in condition for allowa					
closed in accordance with the practice under I	±x parte Quayle, 1935 C.D.	. 11, 453 O.G. 213.			
Disposition of Claims					
4) Claim(s) 1-34 is/are pending in the application					
4a) Of the above claim(s) is/are withdra	wn from consideration.				
5) Claim(s) is/are allowed.					
6)⊠ Claim(s) <u>1-34</u> is/are rejected.					
7) Claim(s) is/are objected to.					
8) Claim(s) are subject to restriction and/o	or election requirement.				
Application Papers					
9) ☐ The specification is objected to by the Examine	er.	·			
10)☐ The drawing(s) filed on is/are: a)☐ acc	epted or b) objected to t	by the Examiner.			
Applicant may not request that any objection to the					
Replacement drawing sheet(s) including the correct	·				
11) The oath or declaration is objected to by the Ex	xaminer. Note the attached	Oπice Action or form P1O-152.			
Priority under 35 U.S.C. § 119		•			
12) Acknowledgment is made of a claim for foreign	n priority under 35 U.S.C. §	.119(a)-(d) or (f).			
a) ☐ All b) ☐ Some * c) ☐ None of:		·			
1. Certified copies of the priority document	ts have been received.				
2. Certified copies of the priority document					
3. Copies of the certified copies of the prior	•	received in this National Stage			
application from the International Burea		-oacived			
* See the attached detailed Office action for a list	or the certified copies not i	i acaivau.			
Attachment(s)	,				
Notice of References Cited (PTO-892)     Notice of Draftsperson's Patent Drawing Review (PTO-948)		ummary (PTO-413) s)/Mail Date			
3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date		formal Patent Application			

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## DETAILED ACTION

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## Response to Arguments

Applicant's arguments with respect to the claims have been considered but are most in view of the new ground(s) of rejection.

## Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 2. Claims 1-34 are rejected under 35 U.S.C. 102(e) as being anticipated by Hall (US 6,071,240). Hall discloses a method for ultrasound imaging through obtaining data from transducers across a receive aperture (Col 1 Line 60-Col 2 Line 15), determining coherence factor (Col 7 Line 10-60), and setting a beamforming parameter as a function of coherence (Col 4 Line 15-55), calculating a ratio of coherent to incoherent sum (Col 7 Line 60-Col 8 Line 40, Col 2 Line 40- Col 3 Line 35), phase variance and calculating coherence factor as a function of time/phase delay (Col 7 Line 45-60, Col 6 Line 1-45). The methods also describe setting transmit parameters; receive parameters, and the individual firings of transducer elements (how many transmit, when they transmit) as a function of coherence (Col 7 Line 13- Col 9 Line 20, Col 6 Line 1-45, Col 4 Line 15-55).

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Mathematical analysis of data is propagated as a function of coherence factor and optionally image filtering can be performed as a function of coherence factor (Col 8 Line 40-Col 9 Line 5, Col 6 Line 60- Col 7 Line 12). Hall discloses an array, a processor for determining CF across the array (Col 7 Line 45-Col 8 Line 15), synthesis of images through multiplication by the coherence factor (Col 4 Line 65-Col 5 Line 10, Col 8 Line 40 – Col 9 line 40), wherein the image processor is able to set the number of beams, size of those beams, focus of the beams, and dynamically sum the range, phase, and energy based on coherence (Col 3 Line 60- Col 4 Line 55, Col 5 Line 20 – Col 6 Line 45).

## **Conclusion**

3. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The Rigby reference to the same assignee is also pertinent to Applicant's disclosure, but does not go into the same detail as the Hall reference, but should be reviewed and used for further understanding of prior art in the area of endeavor.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joel M. Lamprecht whose telephone number is (571) 272-3250. The examiner can normally be reached on Monday-Friday 7:30AM-4PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Brian L. Casler can be reached on (571)272-4956. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

JML 10/10/07

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